DMS-8392, Materials for Motor Vehicle Windshield Validation Stickers

Overview

(Formerly D-9-8392, Motor Vehicle Windshield Validation Stickers).

Effective Date: August 1998 – May 2003.

This specification shall govern for the materials, composition, quality, services, sampling, and testing of materials necessary for production of windshield validation stickers for placement on windshield interior surfaces.

Bidders' and/or Suppliers' Requirements

All prospective bidders and/or suppliers are notified that, before any bid is considered, the materials proposed for submission shall be shown on the list of approved manufacturers of materials covered by this specification and maintained by Vehicle Titles and Registration Division (VTR) of Texas Department of Transportation.

Payment

Payment for all materials and services under this specification shall be in accordance with the conditions prescribed in the contract awarded by the State.

Prequalification and Performance History

Establishment of Performance History

Prospective bidders and/or suppliers, who desire to establish a performance history for materials governed by this specification, must contact the Texas Department of Transportation, Vehicle Titles and Registration Division, 125 East 11th Street, Austin, TX 78701-2483.

At the time of contact, the prospective bidder and/or supplier shall submit technical data exhibiting characteristics of all materials proposed.

After review of technical data, prospective bidder and/or supplier will be contacted regarding quantities of material required for prequalification testing.

Prospective bidders and/or suppliers will be notified, after their material has been evaluated, as to conformance with requirements of this specification.

Prequalification

Prequalification testing for windshield validation sticker material will include, but is not limited to, 200 hours of exposure in an Atlas Type E Weather-Ometer, according to ASTM G 23, and a 60 °C (140 °F) oven.

Prequalification will not be granted until successful completion of all requirements.

Re-evaluation

When, in the opinion of the Director of CST/M&P, changes have been made in the composition and/or manufacturing process of a prequalified material, a re-evaluation of the performance may be required.

TxDOT may conduct additional tests to identify changes in the material. Changes that are detected in composition and/or manufacturing process, which have not been reported by the manufacturer, may be cause for removal of that material from the list of prequalified materials.

Periodic Evaluation

TxDOT reserves the right to periodically evaluate the performance of materials.

Samples for periodic evaluation of performance will be selected at random from materials submitted on state purchase orders.

Failure of materials to comply with the requirements of this specification, as a result of periodic evaluation, may be cause for removal of those materials from the list of prequalified materials.

Technical Services

The successful bidder will provide the validation sticker manufacturing plant with technical services in the use of their material that the Texas Department of Criminal Justice (TDCJ) deems necessary and specifically requests during the training of personnel and the production of windshield validation stickers.

Fifteen (15) man-days of technical service and five (5) man-trips to the plant will be provided at no extra cost by the successful bidder.

Each additional man-days of technical service specifically requested by the TDCJ and each trip necessitated by such request will be compensated at the same rate and subject to the same regulations (where applicable) as provided for state employees and in effect at the time technical services are performed.

This technical service will be provided when requested by the TDCJ and shall be available within 72 hours after such request is made.

NOTE: The technical service provided at locations other than the validation sticker manufacturing plant is not considered a part of this specification.

Sampling and Testing

Sampling and testing shall be in accordance with CST/M&P *Manual of Testing Procedures*.

Costs of sampling and testing are normally borne by TxDOT; however, the costs of sampling and testing of materials failing to conform to the requirements of this specification shall be borne by the supplier.

Costs of sampling and testing of failing materials shall be assessed at the rate established by the Director of CST/M&P and in effect at the time of testing.

Amounts due TxDOT for conducting such tests shall be deducted from partial or final payments on direct purchases by the State.

Sampling

Sampling of sheet or roll materials shall be in accordance with Test Method "Tex-720-I, Sampling Reflective Sheeting."

All liquid materials shall be sampled at the rate of a 0.9 liter (one [1] quart) sample per batch.

Testing

Testing for acceptance of materials submitted on a purchase order will only be considered on those materials that are identifiable as being a material prequalified by the criteria established by this specification and on the list of prequalified materials maintained by TxDOT.

General Requirements

All materials supplied under this specification shall be compatible for use with the equipment currently used by the TDCJ validation sticker plant.

Storage shall be at the temperatures and humidity so that the void feature is not affected as recommended by the supplier.

Material Requirements

This specification covers the general and specific requirements for all materials necessary for the production of motor vehicle windshield validation stickers.

All materials shall meet all requirements of this specification except when specific requirements are shown for a particular material.

General Requirements

Materials shall include, but not be limited to:

- ♦ transparent void release film
- adhesive and
- protective backing.

All sheet or roll type materials shall be received free of ragged edges, cracks, blisters, and free of all foreign materials such as sawdust or flakes and chips of plastics, paper, etc.

All materials required to produce completed validation stickers shall withstand normal printing and lamination operations utilized by the TDCJ validation sticker plant to produce validation stickers acceptable to TxDOT.

Base Film

The base film shall consist of a clear and/or lightly tinted, in an approved color(s), transparent film containing a security feature (as specified under 'Materials Requirements,' 'Base Film, Security Feature'), security seal (as specified under 'Materials Requirements,' 'Base Film, Security Seal'), pressure sensitive adhesive, and adhesive protective liner.

The non-adhesive side of the film shall be such that it can be readily printed on and, after printing, will readily accept the lamination of an opaque backing material of the color specified.

♦ Protective Liners

- The adhesive protective liner shall be of such transparency that six (6) millimeter (1/4 inch) printing, in black, dark blue, and dark red ink on the back of the base film is readily legible (20/20 vision) at 0.9 meters (three [3] feet) when backed with white paper in a normally illuminated 580 lumen/m²/m² (50 foot candles per square foot) room.
- The physical characteristics of the liner shall be such that when it is cut and the base film is bent along the liner cut with the liner to the outside of the bend, the corner of the liner will become free from the adhesive or it can be easily separated from the adhesive with a fingernail.
- Removal of the adhesive protective liner will not activate the "VOID" character on the base film.

The above characteristics shall be retained for a minimum of 21 months storage between 16 and 32 °C (60 and 90 °F) and humidity less than 90 percent. Since this requirement is of such long duration, the supplier shall agree to replace all stickers that fail this requirement if more than 1.0 percent of the completed stickers fail this requirement to the extent that they are not useable.

♦ Security Feature

- Each sticker shall incorporate a repetitive security feature to discourage removal and reuse of the sticker.
- The security feature shall be in the form of the word "VOID" which shall be a minimum of 9.5 millimeters (0.375 inch) in height and 0.76 millimeters (0.030 inch) in stroke width.
- There shall be a maximum spacing of 9.5 millimeters (0.375 inch) between lines and words.
- Activation characteristics of the "VOID" feature shall be such that loosely touching the sticker to clean glass, in a horizontal position, with adhesive protective liner removed and then lifting the sticker off, will not activate the "VOID" characteristic.
- However, rubbing of sticker with moderate thumb pressure or leaving the sticker in place for at least 24 hours, the "VOID" feature will activate upon removal of the sticker from the glass surface.
- The "VOID" characteristic shall be of such quality that when a sticker is placed on a clean glass and exposed for 200 hours in a Weather-Ometer (Atlas, Sunshine Type) or 12 months after affixing to a windshield, the "VOID" characteristic will activate upon removal of the sticker.

♦ Security Seal

- The security seal shall consist of repetitive pattern in the form of seven (7) percent opaque design printed on the protective liner face of the base film.
- The design shall be of the size, shape, and spacing designated by the VTR.
- The security seal shall not adhere to the protective liner and shall not smear or deface during alignment of the sticker.
- The security seal shall not fade or discolor after 200 hours in a Weather-Ometer (Atlas, Sunshine Type) or 12 months after affixing to a windshield.

♦ Adhesive

- The adhesive shall be a pressure sensitive type that will allow repositioning of the sticker prior to application of pressure to the back of the sticker.
- Any residue from the adhesive left on glass or windshield surface upon removal of the sticker following exposure (as described under Base Film, Security Feature of 'Materials Requirements') shall be readily removed by rubbing with the thumb, dry cloth, or use of a common household glass cleaner and cloth.

• The adhesive shall be such that the corner of the base film can be lifted readily with a fingernail sufficient to be able to grasp between the finger and thumbnail to remove the sticker in one piece.

Completed Validation Stickers

In addition to the individual component requirements above, the materials must produce a completed validation sticker, which satisfy the following requirements.

Completed validation stickers shall consist of all layers including backing, base film, adhesive, and protective liner.

Sampling

Completed validation stickers shall be sampled at the rate of two stickers per days production.

The time interval between the two (2) samples shall be at least four hours as directed by TxDOT inspector.

The stickers will then be segregated from the normal production and sent to Texas Department of Transportation, Construction Division, Materials & Pavements Section, Cedar Park Campus, Bldg. 51, 9500 Lake Creek Parkway, Austin, TX 78717.

Testing

The validation stickers shall not curl, wrinkle, fade, discolor, delaminate, or change dimensions after 200 hours in a Weather-Ometer (Atlas, Sunshine Type) or 60 °C (140 °F) oven.